

UNCLASSIFIED

AD NUMBER
AD487575
NEW LIMITATION CHANGE
TO Approved for public release, distribution unlimited
FROM Distribution: Further dissemination only as directed by Chief of Research and Development [Army], Washington, DC 20310, FEB 1963, or higher DoD authority.
AUTHORITY
DAMA ltr, 13 May 1975

THIS PAGE IS UNCLASSIFIED

THIS REPORT HAS BEEN DELIMITED
AND CLEARED FOR PUBLIC RELEASE
UNDER DOD DIRECTIVE 5200.20 AND
NO RESTRICTIONS ARE IMPOSED UPON
ITS USE AND DISCLOSURE.

DISTRIBUTION STATEMENT A

APPROVED FOR PUBLIC RELEASE;
DISTRIBUTION UNLIMITED.

✓ (2)

HumRRRO

487575

This document may be further distributed
by any holder only with specific prior
approval of the Chief of Research and
Development, Department of the Army,

RECEIVED
AUG 25 1966
C

U.S. Army Leadership Human Research Unit
Presidio of Monterey, California

Under the Technical Supervision of

The George Washington University
HUMAN RESOURCES RESEARCH OFFICE
operating under contract with
THE DEPARTMENT OF THE ARMY

U.S. Army Leadership Human Research Unit is established under the command of the Commanding General, United States Continental Army Command. The Human Resources Research Office, the George Washington University, operating under contract with the Department of the Army, employs the Director of Research and other civilian staff members who are assigned to the Unit with the approval of Headquarters, United States Continental Army Command. The Human Resources Research Office provides the Unit with technical supervision in the planning and analysis of the research projects.

Conclusions stated herein do not necessarily represent the official opinion or policy of Headquarters, United States Continental Army Command, or the Department of the Army.

The Human Resources Research Office is a nongovernmental agency of The George Washington University, operating under contract with the Department of the Army (DA 44-188-ARO-2). HumRRO's mission, stated by AR 70-8, is to conduct studies and research in the fields of training, motivation, leadership, and man-weapons system analysis.

Research is reported by HumRRO in publications of several types.

1. *Technical Reports* are prepared at the completion of a research Task or major portion thereof. They are designed specifically for a military audience and convey recommendations for Army action.

2. *Research Reports* may be prepared at any time during a Task. They are designed primarily for a research audience but may be of interest to a military audience. They report research findings of interest and value to the scientific community and do not recommend Army action.

3. *Research Memoranda* may be prepared at any time and need not be directly associated with a particular research Task. They report findings that may be of interest to a research or military audience or to both. They do not recommend Army action.

4. *Consulting Reports* are prepared following completion of a specifically requested consulting action under HumRRO's Technical Advisory Services. They are designed for a specific military audience and usually convey recommendations for Army action.

5. *Research Bulletins* are prepared as nontechnical summaries of one or more research Tasks or as reports of other HumRRO activities. They are intended primarily for a military audience and do not present recommendations for Army action. Their distribution usually includes agencies and individuals conducting research, and the general public.

Technical Reports and Research Bulletins may be requested from the Director's Office, which also issues a complete bibliography. Other publications may be obtained from the Director of Research of the originating Unit or Division.

This document may be further distributed
by any holder only with specific prior
approval of the Chief of Research and
Development, Department of the Army.

RESEARCH MEMORANDUM

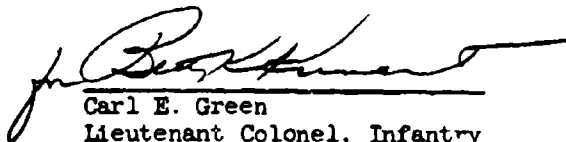
AN EXPERIMENTAL APPROACH
TO TACTICAL INTERROGATION

By
Hilton M. Bialek
Jerald N. Walker
Joanne J. Hood

February 1963


John E. Taylor
Director of Research

Approved


Carl E. Green
Lieutenant Colonel, Infantry
Chief

U.S. Army Leadership Human Research Unit
Presidio of Monterey, California

PAGES _____
ARE
MISSING
IN
ORIGINAL
DOCUMENT

TABLE OF CONTENTS

CHAPTER I:	The Experimental Setting and Methodological Problems	Page 1
CHAPTER II:	Experimental Design	11
CHAPTER III:	Results	17
SUMMARY AND CONCLUSIONS		37
APPENDICES		43

LIST OF TABLES

Table 1:	Numbers of Yielders and Resisters under Resistance Conditions	Page 29
Table 2:	Frequency of Sources Initially Perceived as Resistant or Cooperative Who Resisted or Yielded during Interrogation	30

LIST OF FIGURES

Figure 1:	Experimental Design	Page 13
Figure 2:	Amount of Information: No Resistance Condition	19
Figure 3:	Average Number (and Per Cent) of Items of Information Obtained and Lost: Resistance and No-Resistance Conditions	24
Figure 4:	Average Number (and Per Cent) of Items of Information Obtained and Lost with Yielders and Sources who had not Received a Resistance Set	26
Figure 5:	Average Number (and Per Cent) of Items of Information Obtained by Interrogation Technique	28
Figure 6:	Schematic of Interrogation Content Analysis	32

BRIEF

The purpose of this study was to determine whether experimental simulation of a tactical interrogation situation as feasible. The report describes the experimental situation, the derivation and description of scores measuring interrogation input and output, and the basis and limits for generalizing from the specific experimental setting.

Effects of variations in interrogator technique and arousal of source resistance on the amount and accuracy of information obtained is reported. Both variables are shown to have significant effects under particular conditions. The salient finding is that almost three-fourths of potentially available information is lost under the best of conditions.

Suggestions for implementation and further research conclude the report.

PREFACE

Task QUIZ had its inception on 1 July 1961 in response to a request from ACSI for an investigation into the problems of collecting information via tactical interrogation. It is jointly sponsored by CONARC and ACSI. Initial work included a survey of current interrogational practices and training, and an assessment of resistance training. This work was reported in a Task QUIZ Research Memorandum* dated May 1962, which concluded with recommendations for a research program focusing on techniques for improving the amount and accuracy of information obtained from tactical interrogations. This recommendation was formally submitted as a Subtask Research Proposal and approved by ACSI on 31 July 1962 and by CONARC on 16 August 1962.

This report describes the first phase of that research program.

*Bialek, H. M., Walker, J. N., and Hood, Joanne J. Exploratory efforts concerned with a study of the interrogation process: survey activities, conceptualization and pilot studies. HumRRO Research Memorandum, May 1962.

CHAPTER I

The Experimental Setting and Methodological Problems

The primary objectives of the first phase of the research were to:

- 1) discover whether simulation of certain characteristics of a tactical combat interrogation situation is feasible, and
- 2) determine the effects of various interrogation factors on the amount and accuracy of information obtained.

The meeting of these objectives would lead to improving interrogator usefulness by suggesting more effective techniques, strategies, or areas of emphasis. In order to base these suggestions on empirical and meaningful grounds, several conditions had to be met: How to measure information available for extraction, how to arouse genuine resistance, how to measure the information extracted in an interrogation, and how to control and measure interrogator activities. How these four conditions were handled is described below.

A. Measuring Information Available for Extraction

The first condition to be met was to devise a way to measure the accuracy and amount of information possessed by individuals who would be sources in the interrogation - to be able to define theoretically the information available to an interrogator. The solution was to lead a group of men over one of two parallel and equivalent standard field or observation courses, constructed to represent a combat zone, and judged to present to the men information similar to the type of information a foot soldier might possess upon capture. In addition to being provided with information from their observation of such things as installations,

emplacements, mine fields and units, the group of men was also verbally provided with information pertaining to morale, mission, losses and personalities. (A complete description of the courses, including the verbal briefings, appears in Appendices A and B.) Upon completion of the course, which was approximately 1300 meters long and required about 15-20 minutes to traverse, a written test was administered which was designed to measure how much of the information available was accurately recalled by a source. (A copy of the test appears in Appendix C.) The score on this test was used as an index or baseline for evaluating the amount of accurate information subsequently extracted from each source by an interrogator. This score, which will be reported and discussed in detail later in the report, can also be viewed as an index of just how much and what kind of accurate information a low-ranking prisoner might possess under more or less optimal conditions.

B. Arousing Genuine Resistance

The next condition which had to be met if interrogation was to be studied experimentally involved the arousal in the source of genuine resistance to reveal to an interrogator the information he has. The idea of having subjects play the role of prisoners of war was rejected because the ensuing behavior would obviously be a result of "going along with the game" and would preclude the possibility of engendering genuine motives to resist interrogation. Further, although it would have been a simple matter to instruct sources to resist simply because "this is an experiment on resistance or interrogation," this strategy was likewise rejected because the motive to resist would have been based on a desire to comply

with the experimenter rather than any intrinsic reason. It was obviously desirable that any strategy devised avoid both the "war game" milieu and the "experimental compliance" phenomenon.

The solution was the devising of two different, fictional stories which provided sources with valid reasons for resisting an interrogator. In the first instance, after subjects had been over the observation course and had completed the set of written tests, they were addressed by a Lieutenant Colonel (actually the Military Chief of the Leadership Human Research Unit) who identified himself as the Chief of the "Public Affairs Department, Department of the Army," and explained that the Army, because of Congressional criticism of its resistance training program, was being investigated to see whether, in fact, resistance training is adequate. The subjects were to be interrogated by a team of trained, experienced interrogators assigned by the investigating committee to determine whether Army resistance training is effective; i.e., the interrogators would try to "crack" them. If the interrogators succeeded, then the Army would be discredited. (The text of this address appears in Appendix D.) In this case, the motivation to resist was presumed to be based on a soldier's sense of loyalty to or identification with the Army.

In the second instance, after completing the written tests, different groups of men were also addressed by the Unit Military Chief. This time, however, he was from the "Special Training Selection Board, CONARC." The men were told that they had been selected as possible candidates for some special assignments but because of the nature of the assignment they

had to be screened for security consciousness and resistance skill. For that purpose a team of trained, experienced Army interrogators would see them soon. (The text of this address appears in Appendix E.)

In contrast to the first resistance set described above, the apparent motive to resist here was the desirability of a special assignment. Presumably, if a soldier was disinterested he would have been indifferent to resisting.

Note that in both resistance sets, subjects were not directly instructed to resist nor was there any apparent extrinsic reason for them to do so. If a subject believed the story and if the intended motive had meaning for him (the good name of the Army or a special assignment), he would have resisted for genuine or intrinsic reasons. The extent to which these strategies for arousing genuine resistance were successful will be reported later in the section on results.

C. Measuring the Information Extracted in an Interrogation

This is the third of four conditions necessary to study interrogation experimentally and can be considered one of fundamental importance: effects of the experimental conditions were assessed by the scores measuring obtained information.

To measure the amount and accuracy of information extracted, a plan was worked out whereby any segment of information was broken down into components and credit given for each separate component. For example, if a source correctly reported that he saw the 2nd Artillery Battery in a designated spot and described the location and terrain he would be given one point credit each for 2nd, Artillery, Battery, located 300 meters from

X, and in heavily wooded terrain; i.e., a total of 5 points. This procedure was followed for all possible items of information (mission, units, field installations, etc.) that could be reported. The scoring was done by four individuals who were given special training and who, following a check list, indicated the occurrence and accuracy of every bit of information supplied during an interrogation. A check on the reliability of this scoring procedure, using independent scorers, was highly satisfactory ($r = .90$). Copies of the scorer check lists, including all the scorable items, can be found in Appendix F.

The outcome of this measuring procedure was scores indicating the total number of items given, the total number of correct items, and the total number of incorrect items.

This method of measuring information obtained in an interrogation also made it possible to investigate whether classes of information differed in being more readily obtainable or in the accuracy with which they were reported. That is, it was possible to break down the total results into amount and accuracy of information pertaining to location, terrain, unit identification, mission, morale, etc.

D. Control and Measurement of Interrogator Activities

The last condition to be met required the development of methods to classify reliably the techniques interrogators used during interrogation. The ultimate value of this procedure was to see whether a relation existed between the effectiveness of interrogations and the incidence of particular techniques, approaches or methods.

In a previous report* a conceptualization of the interrogation process envisioned two separate but interdependent interrogator

*Ibid.

activities - manipulation and extraction. Briefly, manipulation refers to all interrogational activities directed toward changing the expectancies, perceptions and motivations of the source in such a way as to encourage, enable or force him to reveal information he possesses which is desired by the interrogator. Extraction refers to the actual act of obtaining the desired information. Accordingly, two separate schemes were tentatively developed to serve as measures of these two activities.

One scheme for categorizing interrogator behavior was based on a concept of manipulative strategies. It was assumed that an interrogator encountering resistance would employ strategies or different roles in his efforts to reduce or overcome this resistance. The tentative scheme initially developed included the "buddy," "boss," distractor, "deceiver," and "outsmarter" roles. Interrogations were monitored and interrogator comments were categorized either as simple information extraction statements, or, if judged to be manipulative in nature, as belonging to one of the five strategies. The strategy scheme is reprinted in Appendix G.

The second scheme was developed to permit a detailed analysis of interrogators' information extraction activities. This scheme is given in Appendix H.

This concludes a description of the methods employed to translate interrogation into an experimental setting. To round out the description of the particular setting, an accounting of how subjects and interrogators were handled is in order.

All subjects were in the last half of their AIT training at Fort Ord, California. They were required to have GT scores of 90 or above, and be able to read and write English. Apart from these restrictions, the chosen men were randomly drawn from their company rosters. On each experimental day, the 16 men selected were picked up at their barracks and driven to the field observation course. Upon completion of the course (described in Section A above), the men were taken to a specially constructed laboratory facility where they received the written tests, a resistance set if required, and were interrogated. A battery of tests was administered to them upon completion of the interrogation and this was followed by a thorough debriefing conducted by members of the Task staff.

The interrogations took place in rooms which were wired, enabling monitors listening in other rooms to perform their scoring or categorizing functions. All interrogations were tape-recorded for later use in reliability checks and as a permanent record of the proceedings. No efforts were made to hide the fact from either interrogators or sources that the interrogation rooms were wired.

The interrogators were four Reserve Army officers serving their annual tours of active duty for training. All had been assigned as instructors for the 1962 session of the Sixth Army Area Intelligence Training School. Through the cooperation of the Commandant of the school, these four men were assigned to the Leadership Unit for the two-week period of data collection. All four men had received intelligence training, including IPW (Interrogator-Prisoner of War) courses, and, in addition, two of them had had actual interrogation experience.

Prior to the experiment, the interrogators were given four hours' briefing and instruction.

In essence, they were told the following:

1. The purpose of the experiment is research on effective interrogation.

2. They would conduct individual interrogations (not to exceed an hour in length) of men who had been over an observation course. They would see four men a day on each of six days.

3. Not all of the men had been over the same course, i.e., they would have different information.

4. They (the interrogators) were to obtain as much information about the observation course as possible from each subject.

5. Some subjects would be cooperative, others would resist. Interrogators would not be told beforehand whether particular subjects would be cooperative or resistant.

6. Those sources who resisted would have a genuine reason for doing so - they would not be playing a game.

7. In twelve of the interrogations, they (the interrogators) would be free to use any resistance-reducing technique they wished, within ethical limits, e.g., they could not strike a source. In the other twelve interrogations, they could only ask direct questions in a straightforward non-threatening manner, in effect, conduct an interview. They would be told when to use which technique.

8. They would be given and would be free to use an enlarged terrain map of the area containing the observation course. The map would show the precise location of the end of the field problem.

9. Immediately after each interrogation, the interrogators would describe on rating forms the source's willingness to give information and the accuracy of the information provided.

The following chapter describes the experimental design used in this first experiment

CHAPTER II

Experimental Design

I. Introduction

This experiment was designed to permit a simultaneous evaluation of the relative effectiveness of (a) the resistance sets in instilling genuine motivation to resist interrogation, (b) the techniques employed by interrogators to reduce such resistance, and (c) interrogators with cooperative and resistant subjects. Its design also permitted a determination of how much information a trained interrogator could obtain under optimal conditions. All these evaluations were based on the amount and accuracy of the relevant information sources provided in the interrogations. The following discussion will elaborate these experimental treatments.

II. Major Variables

A. Resistance

As was discussed earlier, the problem of providing subjects with genuine, valid reasons for resisting interrogation was solved by devising two fictional stories - resistance sets. In the one instance (the special assignment possibility) a source's motivation was presumably self-centered - by withholding information his chances of obtaining a desired personal goal were enhanced. In the other instance (the Investigating Committee story), a source's motivation to resist presumably derived from his loyalty to or identification with the Army. In addition, a third group of subjects received no resistance set at all. This group served as a baseline, i.e., since they had no reason to resist, the amount and accuracy of information

the interrogators could extract from them provided a standard against which to measure the amount and accuracy of information extracted from subjects under varying experimental manipulations. Further, this group provided a basis for estimating the effectiveness of the resistance sets in inducing resistance. That is, those sources for whom the resistance sets were effective should have given less information than those sources having no reason to resist.

B. Interrogation Techniques

Two general interrogation techniques were used. In the one case, designated "free," interrogators were free to conduct their interrogations in any fashion they chose, short of subjecting a source to physical abuse. In the other case, "interview," interrogation procedures were to be confined to the asking of questions in a direct, straightforward way; no form of attempted manipulation of a subject's resistance was permissible.

This variation in technique permitted a check of the effectiveness of the free technique in reducing resistance. If the free technique was effective, its use should have resulted in the obtaining of more information than did the interview technique.

III. Design

The experiment was set up so that 16 subjects would be run on each of six days, a total N of 96. On any given day, eight subjects went over one of the two courses and were under one of the three resistance conditions; the other eight went over the other course and were under a different resistance condition.

The two equivalent observation courses were used in order to prevent interrogators from obtaining too much information too early in the experiment.

Using two courses permitted a more complete picture of the information extraction and accumulation process to be developed, and perhaps required the interrogators to use skills which would have been unnecessary if all subjects had had the same information.

Each interrogator saw four subjects each day. Two subjects had been over one of the observation courses, the other two subjects had been over the other observation course. Figure 1, below, presents schematically the experimental design. There were twelve possible combinations of experimental conditions (resistance varied three ways, interrogation technique two ways, and observation course two ways). By the end of the experiment, each of the four interrogators had seen two subjects under each of the twelve combinations of experimental conditions.

Figure 1. Experimental Design

Resistance Conditions:				None				Investigating Committee				Special Assignment			
Interrogation Techniques:				Free		Interview		Free		Interview		Free		Interview	
Observation Course:				1	2	1	2	1	2	1	2	1	2	1	2
O R D E R	1	I N T E R R O G A T O R	1	N=2											
			2												
	2		3												
			4												

Total N=96

"Order" refers to the counterbalancing of interrogation technique, i.e., under Order 1, interrogators 1 and 2 used the interview technique the first three days of the experiment, and the free technique the last three days; under Order 2, interrogators 3 and 4 used the free technique the first three days, and the interview technique the last three. Since it was felt ~~that~~ ^{that} interrogators would experience some difficulty in alternating effectively from one technique to another, this procedure, involving the least alternation in technique, seemed most desirable.

IV. Measures

Three types of behavioral measures were obtained:

1. Scores reflecting the amount of accurate information and inaccurate information obtained in the interrogations. These were the criterion scores for evaluating the effectiveness of the experimental conditions.

2. Scores reflecting the amount of accurate information about the observation course that sources had prior to being interrogated. These scores (based on the written test taken by sources after they had been over the observation course and before they were interrogated) served two purposes. First, they provided an estimate of the amount of accurate information available to the interrogators. Secondly, they provided a check on the extent to which differences in effectiveness between experimental conditions could be attributed to differences in the amount of accurate information subjects had available.

3. Scores reflecting the frequency of occurrence of different kinds of interrogator behavior, both manipulative (resistance-reducing)

—

CHAPTER III

Results

The results of the experiment will be presented and discussed in this chapter, which consists of four main sections. Section I will deal with results obtained under the no-resistance condition, which serve as a baseline for comparing the results obtained under the resistance conditions. Section II will describe the effects of the resistance sets. The effects of the two interrogation techniques will be reported in Section III. These first three sections will describe three types of results: those concerned with the amount of accurate information obtained, those concerned with the amount of inaccurate information obtained, and those relevant to the accuracy of the total amount of information obtained by the interrogators. Section IV will present findings about interrogator activities.

I. No-Resistance Condition

Thirty-two of the 96 subjects received no resistance set and presumably provided the interrogators with as much information as they were able to recall. It is assumed that this no-resistance condition was optimal from the interrogators' point of view; the sources had no reason to dislike the interrogators (at least at the outset), and the sources had been exposed to the information shortly before the interrogation.

It is further assumed that findings for this no-resistance group are a reasonable estimate of the extent to which, and the accuracy with which, a cooperative person, in relationship with another, can recall a recent experience of this kind.

A. Amount of Information

The interrogators could obtain, on the average, a maximum of 129 items of information from the sources.* Figure 2 shows the amount of information obtained and lost under the no-resistance condition

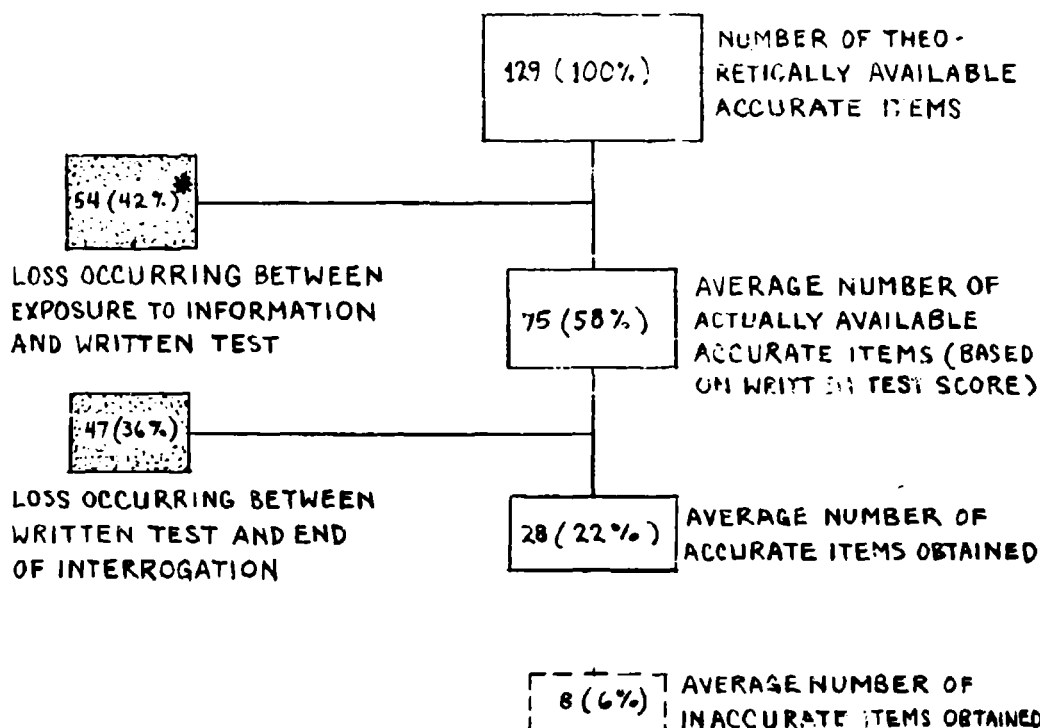
If the exposure to military information is considered as the theoretically maximum input of a system and the results of an interrogation as the empirical output, this diagram indicates that there was a 78% loss in the amount of accurate information from the input to the output of the system. That is, only 22% of the theoretically available accurate items were obtained by interrogators.

It will be recalled that all sources were given written tests prior to being interrogated. By using scores on this test as estimates of the amount of accurate information available for extraction, it is possible, by estimate, to differentiate the loss of accurate information into that lost between exposure of the Ss to the information and the written test, and that lost between the written test and the end of the interrogation. Further inspection of Figure 2 will clarify this point.

This figure, besides revealing an average over-all loss in amount of accurate information of 78% from input to output, shows that an average of 42% was lost between the time the source was provided the information and the time he was tested, and an average of 36% was lost between the

*The figure of 129 is an average. A maximum of 139 items could be obtained from sources who had been over the first observation course, a maximum of 119 from sources who had been over the second course. Half of an interrogator's sources had been over the first course, the other half over the second course.

FIGURE 2 - AMOUNT OF INFORMATION : NO-RESISTANCE CONDITION



*Per cents represent per cent of original 129 items theoretically available.

time of testing and the interrogation. Thus, even under this optimal no-resistance condition, interrogators obtained, on an average, roughly only two-fifths of the accurate information sources had available for extraction. In addition, they also obtained some inaccurate information; 6% of the theoretically available items were supplied to interrogators in an incorrect form. Hence, of the average total amount of information they obtained, 78% was accurate.

It appears that cooperative sources (i.e., those in the no-resistance condition) were reluctant to offer or report information, the accuracy of which they were not sure; under the conditions of the experiment subjects wished to be perceived as accurate, alert observers. This may well be the case with actual interrogation sources who are initially cooperative. That is, such individuals may be equally anxious to win approval or gain esteem in the eyes of the interrogator. The implication is that most information obtained from a cooperative source is likely to be accurate.

B. Analysis, by Type of Information, of Accuracy of Information Obtained

It was noted that of the total amount of information interrogators obtained, 78% was accurate. A sub-analysis was conducted to see whether certain kinds of military information differed in the extent to which they were accurately reported. For this purpose, the content of information presented to the sources was broken down into three categories:*

- a) Briefing material, which included unit designations, personalities, mission, morale, supplies, losses and replacements;
- b) Field Objects-identification, which included objects, signs and fortifications existing in the field problem; and
- c) Field Objects-location, which refers to the position in the field of the field objects.

In comparison, this sub-analysis by category shows that, on the

*There were some additional items scorable for the total interrogation that were not included in this analysis since they could not be combined into a section large enough for meaningful analysis. These were items such as detailed descriptions of terrain, unusual equipment and unusual military symbols.

I
average, 78% of the obtained briefing material was accurate, 91% of field object identification was accurate, and 22% of the field object location items obtained was accurate. These findings clearly indicate that accuracy level was a function of the kind of information. If these findings have any generality, they suggest that the reliability of obtained information having to do with the location of installations or objects should be evaluated with extreme caution. Fortunately, cooperative sources provided a very small amount of such location information compared with the amount they provided for the other two types, so the possibility of using false information is somewhat reduced. If the supposition is true that cooperative sources prefer not to provide information of which they are unsure, it would explain the very small amount of location information they gave.

It is interesting to note how the interrogators viewed the accuracy of the information received. At the conclusion of each interrogation, they rated the accuracy of several kinds of information they obtained from sources. (A copy of the six-point rating scale they used appears in Appendix I.)

These ratings were highly inaccurate - they were not significantly correlated with the measured accuracy of the information - either for the interrogations as a whole (the ratings were pooled and averaged), or for briefing information and field information considered separately.

However, when the accuracy ratings of the individual interrogators were analyzed, one of the four interrogators assigned ratings significantly better than chance for both briefing information alone and

interrogations as a whole, and another interrogator's ratings of briefing information were significantly better than chance.

Speaking generally, the interrogator's evaluations of accuracy of information, when made on bases limited as those of this study (i.e., no outside information sources to draw on for confirmation or rejection) tended to be unreliable. However, this was not necessarily true in the individual case.

C. Comments

The findings in this section serve several purposes. They provide an estimate of both the quantity of information and the amount of correct information obtainable under more or less optimal conditions. In one respect they are discouraging: the amount of information lost (from whatever causes) is greater than one would desire from a legitimate intelligence source. On the other hand, they are encouraging in that the level of accuracy of the information obtained is high; but, ironically, under these conditions of assessment, and in the absence of outside verification, interrogators generally could not discriminate accurate from inaccurate information.

To hazard a generalization from the findings in this section, it seems that routine interrogation of cooperative low level troops for tactical information has a discouragingly low payoff for the amount of time and energy invested. It might be that a more productive approach to such sources is to look for specific information, i.e., focus on one essential element of information rather than trying to obtain a general picture. On the other hand, if general, over-all

information such as that required in this experiment is highly desired from sources of this type, then further research efforts should concentrate on improving interrogator extraction skills.

In succeeding sections, the findings reported in this section were used as a baseline for comparing the effects of experimental manipulations: the inducement of resistance and the use of free vs. interview techniques.

II. Effects of the Resistance Sets

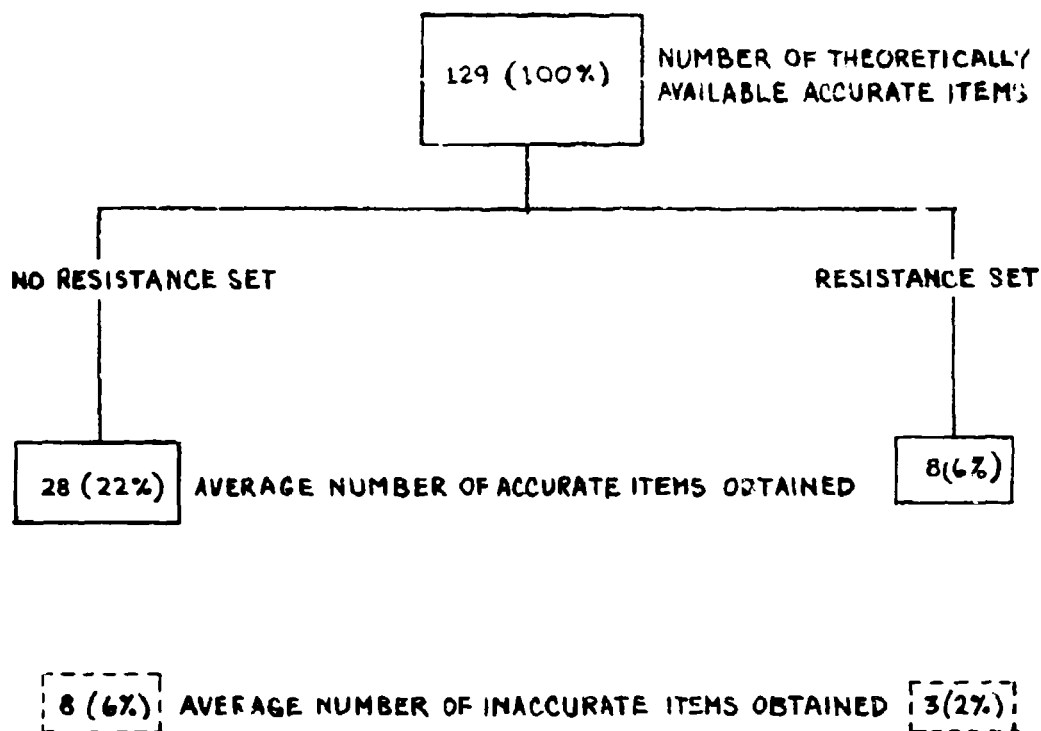
This section of the results deals with the effectiveness of the resistance sets: how accuracy and amount of information obtained were affected.

A. Amount of Information

Figure 3, below, following the paradigm presented in Section I, shows the average number of items of information subjects gave under resistance and no-resistance conditions. (The two resistance sets are shown as one in the Figure since they did not differ significantly in effectiveness from one another.)

It is readily apparent from Figure 3 that under resistance conditions there was a considerable increase in the loss of accurate information over that which occurred in the no-resistance condition. That is, whereas under the no-resistance condition there was an average loss of accurate information of 78%, under resistance conditions this increased by 16% to a total loss of 94%. In addition, even inaccurate information was provided in a lesser quantity by the resistance set group than by the no-resistance sources.

FIGURE 3 - AVERAGE NUMBER (AND PER CENT) OF ITEMS OF INFORMATION OBTAINED AND LOST : RESISTANCE AND NO-RESISTANCE CONDITIONS



This difference between the resistance set groups and the no-resistance group attests to the effectiveness of the sets in motivating subjects to resist. Whereas under the no-resistance conditions an average total number of 36 items had been obtained, under resistance conditions an average total number of only 11 items was obtained: a highly significant difference. The two groups were, however, quite similar as regards accuracy of information obtained: 78% of the information given by no-resistance sources was accurate and 73% of that given by resistance sources was accurate. This finding will be elaborated in the next section.

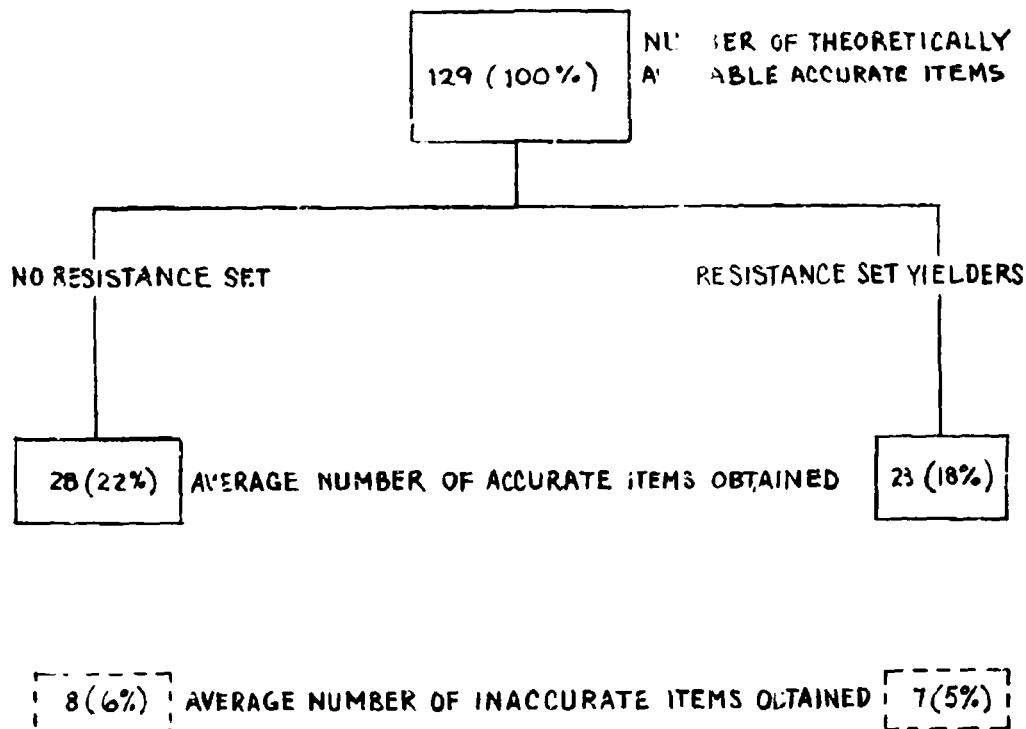
B. Results of the Non-Resisters

The above results are useful in obtaining a general picture. However, because of the fact that so many of the resistance set sources (29 out of 64) gave no information whatsoever, and eight more gave five or fewer items of information, it was considered instructive to examine effects of the resistance sets on the responses of only those individuals who gave information in quantity sufficient that they might be considered non-resisters or "yielders." Hence, an arbitrary criterion was set up to distinguish "yielders" from "resisters." Yielders were defined as persons who initially accepted the resistance set as true but who nevertheless gave six or more items of information to the interrogators, and resisters as persons who gave five or fewer items of information, and who also initially accepted the resistance set as true. By this criterion, 37 sources were Resisters, 20 were yielders.

Figure 4, below, presents the results on the amount of information obtained from Yielders, and for comparative purposes, from those sources under the no-resistance condition.

For the Yielders there was slightly greater loss of accurate information than for subjects who had no resistance set: the average number of accurate items obtained from Yielders was 23, that from sources in the no-resistance condition, 28. Yielders supplied an average of 7 inaccurate items, sources under the no-resistance condition, 8. In effect, the accurate information given by Yielders constituted 75% of all the information that they gave to the interrogators, as contrasted to the 78% accuracy of

FIGURE 4 - AVERAGE NUMBER (AND PER CENT) OF ITEMS OF INFORMATION OBTAINED AND LOST WITH YIELDERS AND SOURCES WHO HAD NOT RECEIVED A RESISTANCE SET



the information obtained under the no-resistance condition. The closeness of these figures strongly suggests that Yielders were not trying to deceive the interrogators. It appears that the Yielders, like subjects under the no-resistance condition, were selective about the information they gave, and tried to provide that which was accurate. It seems highly unlikely that Yielders tried to deceive interrogators and avoid interrogation pressures by appearing to yield while providing erroneous information.

In short, then, from resistance set sources who "yielded," interrogators obtained information approximately as accurate as that obtained from cooperative no-resistance condition sources, although in less quantity.

C. Comments

The findings reported above clearly indicate the feasibility of experimentally arousing genuine resistance. The fact that not every subject receiving a resistance set resisted in no way reduces the apparent validity of this experimental manipulation.

III. Effects of Interrogation Technique

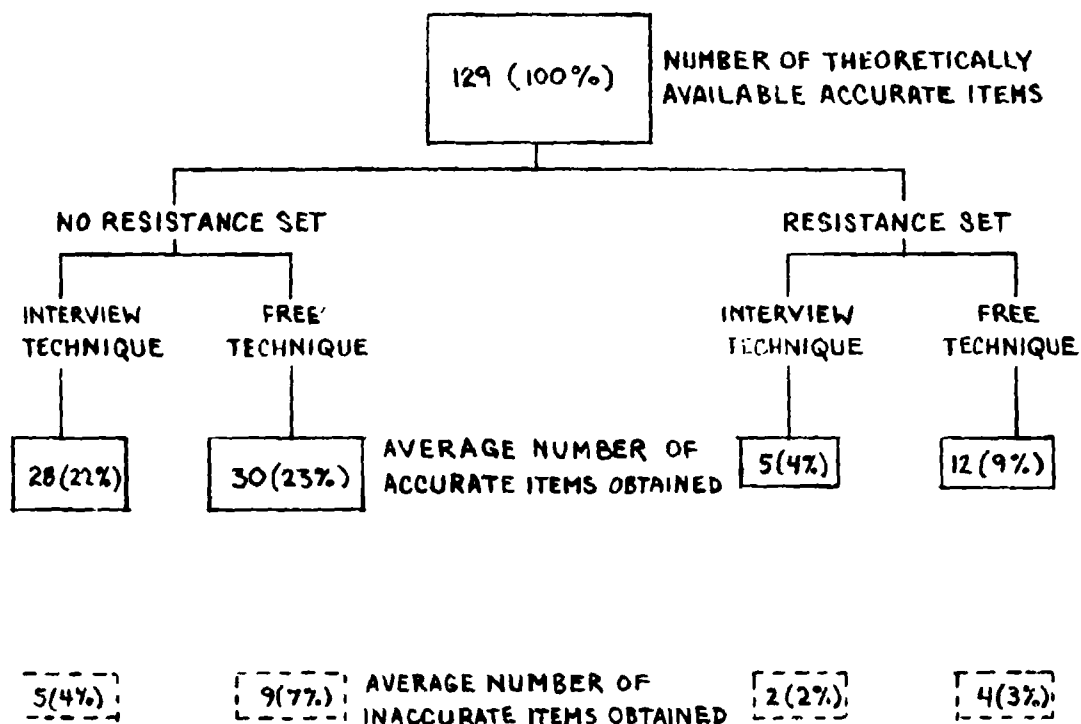
The preceding sections took note of several salient findings: the sizable amount of information which is lost, the effectiveness of the resistance sets, the similarity in amount and accuracy of information obtained from cooperative sources (no-resistance condition) and those who, with reason to resist, "yielded."

This section will examine how amount and accuracy of information differed as a function of the two kinds of interrogator technique. Figure 5 summarizes these findings, showing the average number of items of information sources gave under resistance and no-resistance conditions, for both free and interview techniques, separately.

From Figure 5 it can be seen that, under the no-resistance condition, there was a difference between the average total number of items obtained under free and interview techniques. However, this difference was not statistically significant. This suggests that in working with a cooperative source, an interrogator's freedom to use his manipulative skills had no appreciable effect on the amount of information extracted.

Another salient finding was that the interrogators, when relatively unrestricted, were successful to a significant extent in mitigating the effects of the resistance sets. That is, under resistance conditions,

FIGURE 5. AVERAGE NUMBER (AND PER CENT) OF ITEMS OF INFORMATION OBTAINED BY INTERROGATION TECHNIQUE



their use of the free technique resulted in significantly more information being obtained than did use of the interview technique, an average total number of items of 16 vs. 7. Subjective impressions suggest that deception was the most effective technique in reducing the subjects' resistance, if, indeed, not the only effective one. However, it may be that this was an artifact of the specific experimental setting. This point will be discussed in greater detail in Section IV.

It should be pointed out that, although interrogators obtained more information by the free than the interview technique under the resistance

condition, still, the amount obtained was far less than that obtained under the no-resistance conditions. That is, even when interrogators were free to manipulate sources' resistance, they were still unable to attain the level achieved under no-resistance conditions.

The picture of the effectiveness of interrogator technique can be supplemented by a consideration of the number of subjects who gave information under the two interrogation conditions. Table 1, below, presents the number of subjects who "resisted" and the number who "yielded" under each of the conditions.

Table 1

Numbers of Yielders and Resisters under Resistance Conditions
(Ss who did not initially believe the resistance sets are excluded.)

Interrogation Technique			
	Interview	Free	Total
Resisters	25	12	37
Yielders	3	17	20
	28	29	57

As would be expected, significantly more of the subjects interrogated under the interview technique resisted than of those subjects interrogated under the free technique. Twenty-five of the 28 sources interrogated under the interview technique resisted; only 12 of the 29 sources interrogated under the free technique resisted.

One observation in regard to the sources' perceived initial resistance should be pointed out. The interrogators, it will be recalled, had

been asked to rate, on a six point rating scale (See Appendix J) at the end of each interrogation, how willing the source had been to give information at the beginning of the interrogation. The results of these ratings for those sources who had believed the resistance set story or were uncertain about it both at the beginning and at the end of the interrogation, and who also were seen by interrogators under the free technique, are shown in Table 2. Those data suggest that the initial perception of a source's degree of resistance (independent of the accuracy of the perception) was a poor indicator of whether or not he would subsequently reveal information.

Table 2

Frequency of Sources Initially Perceived as Resistant
or Cooperative Who Resisted or Yielded during Interrogation

	Initial Perception Resistant	Initial Perception Cooperative	Total
Resisters	11	1	12
Yielders	11	3	14
	22	4	26

IV. Interrogator Activities

Despite the fact that the over-all outcome of the interrogations could be considered low, there was substantial variation even within the no-resistance condition in the amount of information obtained. Therefore, the question arose as to whether certain activities of the interrogators were differentially associated with high and low outputs. This section

presents the results of analyses intended to account for differences in interrogation effectiveness. The first part discusses those interrogator activities which fall in the category of information-extraction; the second elaborates why it was not feasible to proceed with an analysis of interrogator manipulative activities as had been planned.

A. Information Extraction Activities

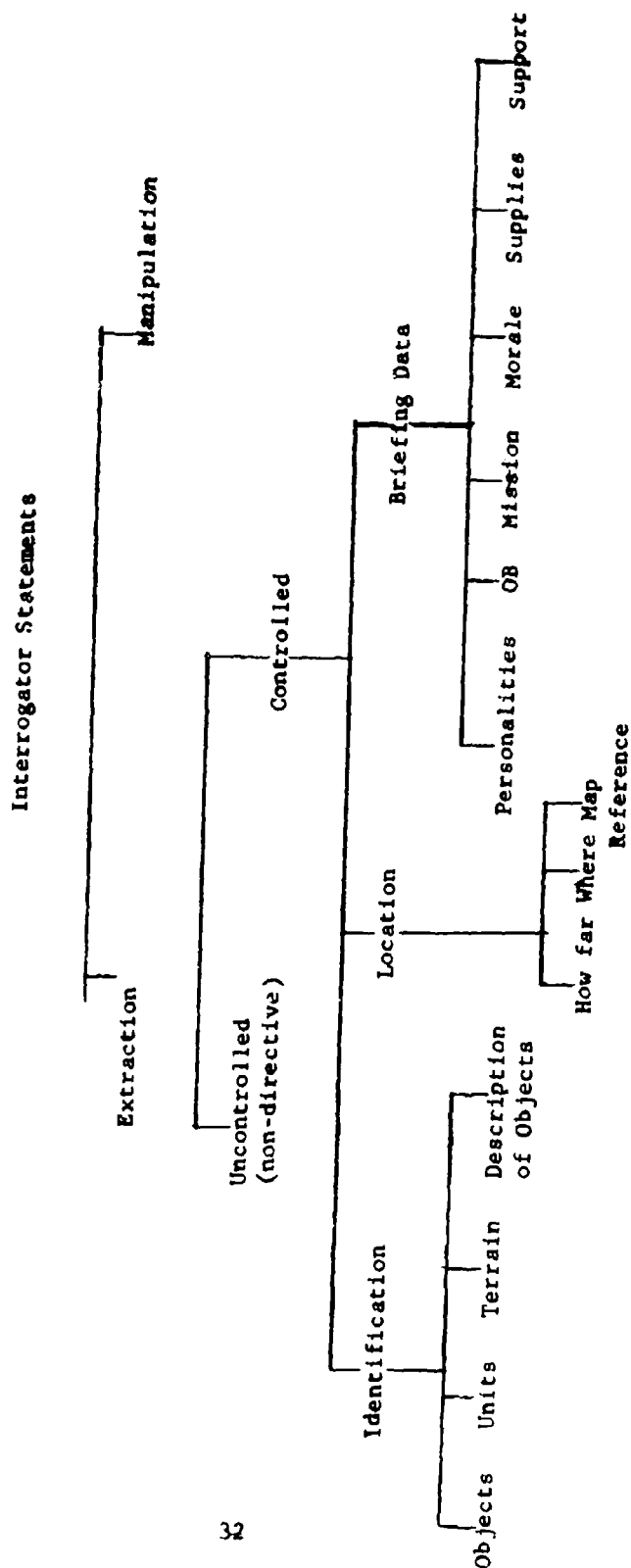
An analysis was made to determine whether the kinds of questions the interrogators asked were differentially effective in obtaining information. It was hypothesized that higher output was, in part, a function of the type and frequency of questions the interrogators asked. To test this hypothesis, all of the sources who had not received a resistance set were divided into two groups, a high output group which consisted of those who had given the most information, and a low output group which consisted of those who had given the least. (Data for all comparisons of these two groups are given in Appendix H.) A categorization scheme was designed to classify all interrogator statements, excluding those judged as manipulative in content.* The major and sub-categories of this scheme appear in Figure 6.

The questions asked by the interrogators were categorized by four observers from tape recordings after the experiment had been completed. Generally, the reliability of their ratings was quite satisfactory. (Specific data are presented in Appendix H.)

*The frequency of manipulative statements in the no-resistance condition was so low as to make the extraction analysis essentially a content analysis of interrogator verbalization.

FIGURE 6

Schematic of Interrogation Content Analysis



The hypothesis that the kinds of questions the interrogators asked were differentially effective was not supported. There was no clear evidence that high output interrogations were characterized by different types of questions or by the differential frequency of particular questions. Only one category significantly separated high and low output groups: "identification of units in the field," which was used more frequently in interrogations of the high output group. However, this single significant difference could be attributable to chance inasmuch as 36 separate comparisons were made.

Since this hypothesis was not supported, other possible sources of variation to account for the differences between high and low output groups were considered.

The two groups were not found to differ in their reactions to the interrogations or the interrogators; i.e., they did not differ significantly in the amount of subjectively experienced stress they reported during or before the interrogation, or in their hostility toward the interrogators. Nor did they differ in loyalty to the Army. Further, the difference between the two groups was not a function of the amount of accurate information they had available - they did not differ in their scores on the written test.

However, the high output group did spend significantly more time in the interrogations. But, subjective impressions were that the interrogators got all they could from the sources, which argues against the possibility that they got more information from the high output group simply because they spent more time with them. The high output sources may simply have been a more verbal, articulate group than the low.

Further, 7 of the 16 men in the high output group had been seen by the same interrogator. This suggests the possibility that interrogator characteristics not examined here were a contributing factor in differential effectiveness.

In summary, the results indicate that neither the type nor frequency of the questions asked is an adequate explanation of differences in the amount of information obtained in the interrogation of cooperative sources. The answer may lie in the articulateness or verbal ability of the sources, or it may lie in differences among interrogators.

B. Manipulative Activities

As noted earlier in this section of the results, no analysis was made of those interrogator activities of a manipulative nature, as had been planned. This was because basic assumptions which would have made such an analysis feasible were laid open to serious question during the course of the experiment.

While we did not assume that our experimental setting simulated combat interrogation (in the sense of the presence of certain psychological factors commonly assumed to exist under actual conditions, such as fear and uncertainty), we did assume that there was sufficient commonality between the two that interpersonal exchanges could readily occur which occur in the real-life counterpart. It appears, however, on the basis of observations made during the experiment, that constraints existed of such a nature that this condition was not met.

It appears that genuine motives to resist were aroused in our sources. However, it is doubtful that the interrogators' motivation

approximated in kind or intensity that of a combat-interrogation situation. We believe that the interrogators were highly motivated to perform well and to demonstrate their ability. Notwithstanding, in the real-life situation, an interrogator's motivation is also based on the serious consequences of failure in his mission. The consideration of possible loss of lives or of a battle, though perhaps not part of the conscious behavior of an interrogator, must underlie part of his approach to his mission.

Secondly, the undeniable recognition on the part of the sources and interrogators that the exercise was taking place in peace-time California, and that their adversaries were men of the same organization, placed a large amount of constraint upon the manipulative strategies available to the interrogators. As a result, most of the strategies the interrogators attempted failed, and the majority of successful "breakings of resistance" involved deception - the interrogators making the source believe that the interrogation was over and that it was permissible to give information, or making the source believe that the situation was not an interrogation at all. The point is that the constraints forced the high frequency of appearance of this strategy: frequent use of deception and its singular effectiveness was an artifact of the experimental conditions. It follows, then, that any generalization from the experiment reported here concerning manipulative activities would be unreliable. It is for this reason, too, that an analysis of manipulative activities was not performed.

A more serious implication for future research, if manipulative activities are to be a primary variable, is that subsequent laboratory

experimental treatments of interrogation are subject to the same limitation. In studying low-level tactical interrogation, there does not seem to be a way to design field-laboratory experiments which would allow interrogators sufficient range of manipulative behavior that findings would be applicable to the problems of the consumer.

The only qualification to this statement would be an indication of a very strong, active support and interest in such investigations on the part of a consumer, which would permit experimental interrogators a wider range of manipulative techniques.

One alternative to the dilemma would be the study of interrogation problems in a natural setting. This alternative, while avoiding the problem of interrogator constraints, would, however, have the attendant disadvantage of lack of control, because of limited ability to specify interrogator behavior and limited ability to determine sources' knowledge. These factors would most likely necessitate a somewhat less precise approach and analysis than would be the case in a field-laboratory setting.

Summary and Conclusions

I. Problem

This report describes an initial effort to simulate experimentally certain characteristics of a tactical combat interrogation situation.

The purposes of this effort were to:

- 1) discover whether such simulation is feasible, and
- 2) determine the effects of various interrogation factors on the amount, accuracy and kind of information obtained.

II. Method

A. Ninety-six randomly selected soldiers from Fort Ord, all in AIT, were used as sources for interrogation. Sixteen men per day were randomly divided into two eight-man groups. Each group was run through one of two parallel field observation courses built to simulate, in content and position, a combat zone. In addition to observation of terrain, fortifications, and installations, sources received additional information verbally. This included topics such as order of battle, mission, morale, and replacements.

A written test, administered approximately 20 minutes after completion of the course, was designed to test recall of the experience. Following this, two-thirds of the total sample ($N = 64$) were given a "resistance set" designed to arouse a genuine motive to resist giving the information they had been exposed to on the field course.

Each of four trained interrogators saw a total of 24 sources, four a day over six days. Interrogators knew only that sources had

been out in the field, and their objective was to obtain as much information as they could within an hour per source.

B. Two main independent variables, in addition to interrogators, were involved: interrogation technique (free vs interview) and resistance vs no resistance. The design called for each interrogator to see half of his 24 sources under one of the two interrogation techniques, with two-thirds of his sources under each technique receiving a "resistance set."

C. Among several measures of the effects of these manipulations, two were used to measure information obtained: the number of accurate items obtained per interrogation and the number of inaccurate items obtained per interrogation.

III. Findings

A. No-Resistance Conditions

1. The amount of accurate information lost was surprisingly high: 78% of the information theoretically available was lost to the interrogators.

2. Approximately half of the accurate information lost was attributed to forgetting and failure to observe on the part of the source. The other half was attributed to the interrogation interaction itself.

3. Approximately two-fifths of the accurate information the sources had available was obtained by the interrogators.

4. Approximately three-fourths (78%) of the total amount of information the interrogators obtained was accurate.

5. There were significant differences in the accuracy of

different kinds of information obtained. Most reliable was information pertaining to identification; least reliable was that having to do with location and distance.

6. The interrogators, as a group, were unable to estimate correctly the accuracy of the information they obtained. However, certain interrogators' estimates for some specific kinds of information were more accurate.

B. Effects of Resistance Sets

1. The resistance sets were quite effective in that a lesser amount of accurate information was obtained from sources who had received a resistance set than from sources who had not. In contrast to the 78% of the no-resistance condition, 94% was lost under the resistance set condition.

2. Only slightly less information was obtained from Yielders* than from cooperative sources (those under the no-resistance condition).

3. Most of the information the Yielders gave was accurate - 74%, a finding similar to that which obtained under no-resistance conditions, where 78% of the information obtained was accurate.

C. Effects of Interrogation Techniques

1. When sources were cooperative (no-resistance condition) there was no difference in the effectiveness of free and interview techniques (for the total amount of information obtained).

2. With resistant sources, the free technique was superior in

*Those sources who, given and believing the resistance set story, nonetheless gave six or more items of information.

effectiveness to the interview technique.

3. Whether or not a source subsequently yielded to an interrogator was not related to the interrogator's perception of the source's initial level of resistance.

4. Significantly more of the sources who were given and initially believed the resistance sets yielded under the free interrogation technique than under the interview technique.

D. Interrogator Activities

1. There were no consistent differences between the verbal behavior of interrogators (as measured by type and frequency of questions) associated with high output interrogations and that behavior associated with low output interrogations.

2. The constraints of the experimental setting created certain artifacts which prevented a valid analysis of manipulative techniques.

IV. Conclusions

Generalizations from these findings should be limited to situations involving cooperative sources and low-ranking military personnel.

A. Feasibility of Simulation

It is possible to simulate experimentally a tactical combat interrogation situation if the use of force or extreme duress can be meaningfully excluded. The interrogator-source interplay, the kinds of information involved, and the resistance sets, appeared to have sufficient face validity as to be meaningfully related to the actual situation.

A second encouraging observation from an experimental viewpoint is that the interrogators could, in a certain percentage of cases, overcome the source's resistance, especially when they were free to use any technique they wished. Thus it would seem that some sort of balance was experimentally created wherein the sources' resistance, as a group, was not so strong as to prevent any successful manipulation, yet not so weak as to preclude all strenuous resistance. The clear superiority of the free technique vs. the interview technique in enabling resistance to be overcome in certain instances, while not unexpected, does serve to show that interrogational skill and maneuvering are critical elements in the interrogation process when resistance is encountered.

B. Effects of Various Interrogation Factors

1. The great loss of information observed in this study, under conditions optimal for obtaining information, suggests that routine interrogation of low-ranking military sources for tactical information is rather inefficient.

2. Since high and low output interrogations were not characterized by (at least one kind of) differences in verbal behavior of interrogators, subsequent studies might profitably focus on isolating behavioral characteristics which distinguish successful interrogators. This should be done also with a view to discovering whether such characteristics can be taught.

C. General

1. It appears that there are a number of serious ethical problems and practical obstacles to translation of the manipulative aspects of


interrogation into an experimental setting.

2. Interrogation research should be broadened in scope to include all kinds of interrogation situations, not only those at the tactical level.

3. The experimental setting and methodology described in the study should be incorporated into the Program of Instruction of the IPW (Interrogator, Prisoner-of-War). The several advantages of realism, measurement (and hence objective evaluation of the IPW student), economy and opportunity to vary the content easily, all argue for substituting the exercise for the "canned" practical one contained in the current program of instruction.


APPENDIX A-1

Description of Course 1 Field Objects

1. Starting Point - Brigade HQ
2. Aid Station (sign)
3. 15 inf. CP
4. Mine Field/Antitank Ditch
5.  (sign)
6. 2nd Arty Btry. (sign)
7. MP Check Point (sign)
8. STAV Area (sign)
9. Ravine/Ammo Point
10. Unusual Equipment
11. Concertina Wire
12. 6 Commo Unit (sign)
13. Company Position
14. Pickup Point

APPENDIX A-2

Description of Course 2 Field Objects

1. Starting Point - Division HQ
2. LAN Area (sign)
3. PW Collection Point
4. 4th Recon Troop (sign)
5. Engineer Supply Point
6. Mine Field
7. Observation Post
8. CP 16th Bn.
9. Unusual Equipment
10.  (sign)
11. 8 Salvo Unit (sign)
12. Concertina Wire
13. Company Position
14. Pickup Point

APPENDIX B-1

Briefing

I am going to guide you men to your company. You have been sent to us as replacements because we, that is Bravo Company of the Fifteenth, have suffered casualties during the last few days of fighting. We are actually at half strength now.

You guys are lucky. The Fifteenth Infantry is the best in the Seventh Brigade and Bravo Company is the best company in the Fifteenth Infantry. Captain Miller is up there at Brigade Headquarters right now (GESTURING TOWARD WOODS), getting a personal briefing from the Commanding General. General Lee thinks a lot of our outfit. That's why our company is going to spearhead the attack tomorrow morning.

I know the Captain is going to want to speak to you fellows himself when he gets back, especially since there are no platoon officers in the company. Captain Miller is a good Joe. He gives you a job to do and then leaves you alone.

Our company is located right up on the front line, about a mile up this road, but I'll guide you there. We'll move out in a minute. I want you to stay alert, keep your eyes open and remember what you see. You may not get another chance to see the ground during daylight. The Seventh Brigade is scheduled to jump off tomorrow morning at 0600 hours with our company in the lead in this sector. At least that's what we figure old Robert E. wanted the Captain for this morning.

We'll be in pretty good shape because we are expecting about 200 extra men as reinforcements. It's too bad we are short of tanks.

All right, let's move out!

(IN THE RAVINE) Remember this place! Some of you may be sent back here tonight to pick up ammunition.

APPENDIX B-2

Briefing

I am going to guide you men to your company. You have been sent to us as reinforcements because we, that is Charley of the Sixteenth, are going to need all the extra men we can get even though we're now at full strength.

I feel sorry for you guys. The Sixteenth used to be the best in the Eighth Division and Charley Company the best in the Sixteenth Battalion. Lt. Larson is up there at Division Headquarters right now (GESTURING TOWARD WOODS) getting a chewing out from General Grant. The General never seems to be satisfied with what we do. That's probably why we got the lousy job of holding the sector at all costs.

I know the Lieutenant is going to want to speak to you fellows himself when he gets back. He never trusts anybody else to do a job.

Our company is located about a mile and a half up this road. But I'll guide you there. We'll move out in a minute, stay in single file. I want you men to stay alert, keep your eyes open and remember what you see. You may not get another chance to see the ground during daylight, especially if the enemy attacks tomorrow morning as expected.

We heard that they'll hit our sector at 0600 hours. At least that's what we figure old U.S. wanted the Lieutenant for this morning.

I don't know how good shape we'll be in. We're short of ammunition but we expect to get replacements on the tanks we're short.

All right, let's move out.

(AT ENGINEER SUPPLY POINT) Remember this place! Some of you may be sent back here tonight to pick up wire and tools.

APPENDIX C-1

NAME _____

TAG NO. _____

Part I

For each of the next 20 items, you are to mark the one answer, of the four supplied, which is most correct. Most of this information was given to you in the briefing at the beginning of the course. If you don't know which is the correct answer, go ahead and guess. Mark the "none of the above" alternative if the other three answers are not correct. Be sure to mark one answer for every item. GUESS if you are not sure or don't know.

For example, if you were told that you were assigned to the 3rd Battle Group, you would mark the item below as follows:

EXAMPLE: 1. You were assigned to the:

1. () 2nd Battle Group
2. (X) 3rd Battle Group
3. () 1st Battle Group
4. () none of the above

1. You were assigned to

1. () Company A
2. () Company B
3. () Company C
4. () none of the above.

2. Your company is scheduled to

1. () hold the sector at all costs
2. () continue patrol activities
3. () spearhead an attack
4. () none of the above

3. Your company commander

1. () never trusts anybody else to do a job
2. () gives you a job to do and then leaves you alone
3. () is always on the job
4. () none of the above

4. Your unit

1. () is not expecting tank replacements
2. () is expecting tank replacements
3. () is awaiting word on tank replacements
4. () none of the above

5. You were assigned as a
1. ☐ reinforcement
 2. ☐ replacement
 3. ☐ specialist
 4. ☐ none of the above
6. Your outfit is
1. ☐ awaiting additional supplies
 2. ☐ short of ammunition
 3. ☐ not short of ammunition
 4. ☐ none of the above
7. During the last few days, your company has been
1. ☐ regrouping
 2. ☐ engaged in fighting
 3. ☐ engaged in patrol activities
 4. ☐ none of the above
8. Your unit
1. ☐ is not short of tanks
 2. ☐ has no tanks
 3. ☐ is short of tanks
 4. ☐ none of the above
9. Your company CO is
1. ☐ respected
 2. ☐ a good Joe
 3. ☐ a practical joker
 4. ☐ none of the above
10. At the time you were assigned to it, your company was
1. ☐ at full strength
 2. ☐ at half strength
 3. ☐ almost wiped out
 4. ☐ none of the above
11. Your company is part of the
1. ☐ 16th Battalion
 2. ☐ 15th Battalion
 3. ☐ 15th Infantry
 4. ☐ 16th Infantry

12. Your unit is part of the
1. ☐ 7th Division
 2. ☐ 8th Brigade
 3. ☐ 8th Division
 4. ☐ 7th Brigade
13. Your unit is expecting
1. ☐ 100 new men
 2. ☐ 200 new men
 3. ☐ 300 new men
 4. ☐ none of the above
14. Your company
1. ☐ has all of its platoon officers
 2. ☐ is short of platoon officers
 3. ☐ has no platoon officers
 4. ☐ no mention was made of platoon officers
15. The commander of the entire outfit
1. ☐ thinks a lot of your company
 2. ☐ gives a lot of assignments to your company
 3. ☐ doesn't think much of your company
 4. ☐ none of the above
16. Your company commander's name is
1. ☐ Taylor
 2. ☐ Larson
 3. ☐ Miller
 4. ☐ Johnson
17. The action will start at
1. ☐ 0600 in the morning
 2. ☐ 0500 in the morning
 3. ☐ 0400 in the morning
 4. ☐ none of the above
18. The commander of the entire outfit is
1. ☐ Jackson
 2. ☐ Lee
 3. ☐ Grant
 4. ☐ none of the above

19. Your entire outfit is scheduled to

1. ☐ withdraw
2. ☐ attack
3. ☐ maintain its position
4. ☐ none of the above

20. Your company CO's rank is

1. ☐ Lieutenant (unspecified)
2. ☐ 2nd Lieutenant
3. ☐ Captain
4. ☐ 1st Lieutenant

APPENDIX C-2

NAME _____

TAG NO. _____

Part II

During the field exercise you saw items of military equipment, fortifications, or signs designating military units or areas. Several such items are listed below. You are to indicate whether or not you saw each item by making a check in the parentheses in front of either the word "seen" or the words "not seen" following the item. That is, if you saw the item, place a check in the parentheses in front of the word "seen." If you did not see the item, place a check in the parentheses in front of the words "not seen."

Then, for each item you recall having seen, you are to indicate on the corresponding line at the right of the page the distance in yards or meters the item was from the starting point. For example, if you recalled having seen the first item below, "00. Jeep" at 650 meters, it would be marked as shown: a check in the parentheses in front of the word "seen" and the figure "650" on the corresponding line at the right.

Be sure to

- 1) indicate for each item whether you did or did not see it;
- 2) indicate for each item you saw the distance it was from the starting point;
- 3) GUESS if you are not sure or don't know.

NAME _____

TAG NO. _____

Distance in
Yards or Meters from
Starting Point

00	Jeep	(x) seen	() not seen	<u>650</u>
1.	Minefield	() seen	() not seen	_____
2.	2 Artillery Battery	() seen	() not seen	_____
3.	MP Check Point	() seen	() not seen	_____
4.	Observation Post	() seen	() not seen	_____
5.	Company Position	() seen	() not seen	_____
6.	Unusual Piece of Equipment	() seen	() not seen	_____
7.	Barbed Wire	() seen	() not seen	_____
8.	Prisoner of War Collection Point	() seen	() not seen	_____
9.	Ammunition Point	() seen	() not seen	_____
10.	Communication Wire	() seen	() not seen	_____
11.	6 Commo Unit	() seen	() not seen	_____
12.	8 Salvo Unit	() seen	() not seen	_____
13.	Command Post 16th Battalion	() seen	() not seen	_____
14.	Sign with an Unusual Symbol	() seen	() not seen	_____
15.	Engineer Supply Point	() seen	() not seen	_____
16.	Sign Indicating Compass Points	() seen	() not seen	_____
17.	Lan Area Sign	() seen	() not seen	_____
18.	Division Headquarters	() seen	() not seen	_____
19.	Mockup of a Jeep	() seen	() not seen	_____
20.	Brigade Headquarters	() seen	() not seen	_____
21.	4 Reconnaissance Troop	() seen	() not seen	_____
22.	Tank Defilade Area	() seen	() not seen	_____
23.	Assembly Area	() seen	() not seen	_____
24.	15th Infantry Command Post	() seen	() not seen	_____
25.	Aid Station	() seen	() not seen	_____
26.	STAV Area Sign	() seen	() not seen	_____

APPENDIX C-3

NAME _____

TAG NO. _____

Part III

Listed below is a series of terrain features. Place a check mark in the parentheses in front of each feature you remember seeing on the field exercise. GUESS if you are not sure or don't know.

1. () Area with large boulders or rocks
2. () Ravine, gully
3. () Small marsh
4. () Top of a hill
5. () Small stream
6. () Sand dunes
7. () Road running alongside dry lake-bed
8. () Broad open field
9. () Burned-off area
10. () Paved road

APPENDIX C-4





NAME _____

TAG NO _____

Part IV-1

If you had seen everything on the observation course, you would have noticed an unusual symbol sign. If you did not see the unusual symbol sign, do not answer Question 1, and put a check in the parentheses (). If you did see it, put a check mark in the parentheses in front of the correct answer to Question 1. Guess if you are not sure or don't know.

1. The unusual symbol sign read:

1. () ☐ 
2. () ☒ 
3. () ☐ 
4. () ☐ 

If you had seen everything on the observation course, you would also have noticed an unusual piece of equipment. If you did not see the unusual equipment, do not answer Questions 2-5, and put a check in the parentheses (). If you did see it, put a check mark in the parentheses in front of the correct answer to each question. Guess if you are not sure or don't know.

2. The dimensions of the unusual equipment were roughly:

1. () 4 feet by 4 feet by 10 feet
2. () 1 foot by 1 foot by 4 feet
3. () 2 feet by 4 feet by 8 feet
4. () 18 inches by 2 feet by 6 feet

3. Markings on the equipment read:

1. () AGEMO
2. () ANLAC
3. () AFRAN
4. () ATLED

4. Numbers on the equipment read:

1. () 437

2 () 259

3. () 459

4. () 357

5. Additional features on the equipment were (check as many as you saw):

1. () dials

2. () telescope

3. () radar

4. () antennae

5. () gun muzzle

6 () wheels

7. () exhaust pipe

Part IV-2

If you had seen everything on the observation course, you would have noticed an unusual symbol sign. If you did not see the unusual symbol sign, do not answer Question 1, and put a check in the parentheses (). If you did see it, put a check mark in the parentheses in front of the correct answer to Question 1. Guess if you are not sure or don't know.

1. The unusual symbol sign read:

1. () [—
2. () [—
3. () |—
4. () [—

If you had seen everything on the observation course, you would also have noticed an unusual piece of equipment. If you did not see the unusual equipment, do not answer Questions 2-5, and put a check in the parentheses (). If you did see it, put a check mark in the parentheses in front of the correct answer to each question. Guess if you are not sure or don't know.

2. The dimensions of the unusual equipment were roughly:

- 1 () 4 feet by 4 feet by 10 feet
2. () 1 foot by 1 foot by 4 feet
3. () 2 feet by 4 feet by 8 feet
4. () 18 inches by 2 feet by 6 feet

3. Markings on the equipment read:

1. () AGEMO
2. () ANLAC
3. () AFRAN
4. () ATLED

4. Numbers on the equipment read:

1. () 437

2. () 259

3. () 459

4. () 357

5. Additional features on the equipment were (check as many as you saw):

1. () dials

2. () telescope

3. () radar

4. () antennae

5. () gun muzzle

6. () wheels

7. () exhaust pipe

APPENDIX D

Good morning. I am Col. Green, Chief of the Public Affairs Department, Department of the Army. As you may know, the Army has been under fire recently. There has been Congressional subcommittee criticism and investigation. Charges have been made that U. S. soldiers are not capable of standing up to enemy interrogation techniques. As a result, an investigative committee has been set up to find out in fact just how well soldiers have been trained to resist interrogation. You men are participating in part of this investigation today.

All you have been through this morning is part of the investigation. We have been assisted by members of the Leadership, Human Research Unit, who developed and built the course you were over, and who assisted in giving the written tests. The briefing and field problem were for the purpose of providing you all with a common fund of information - the kind most likely to be held by a person being interrogated. The written tests were for the purpose of finding out just how much you actually learned - how much information you would have available to give to an interrogator. Finally, now, you will each be interrogated individually, by an experienced interrogator, to find out just how well you can resist interrogation. Just how you avoid or evade the interrogator's questioning is up to you.

Your interrogators will know only that you have been through a field problem, and that there is an investigation going on. If they have any other information, it will have been obtained from other people who have been over the course.

Just remember, any bit of information you give them discredits the Army and its training: it becomes a brick for critics of the Army to use against it.

No doubt you have some questions. Please hold these till later. There will be a debriefing following your interrogation, and all your questions will be answered then. Right now, do your best to resist in the interrogation. The Army is counting on you.

APPENDIX F

Good morning. I am Col. Green of the Special Training Selection Board, Continental Army School. Now, I am going to tell you what this exercise is all about.

My committee has the responsibility for selecting enlisted military personnel for special training assignments which require, among other things, the ability to maintain security of classified information. At this stage, I can't tell you any more about these assignments. However, you men are all qualified for some of these positions, and now we are going to see whether or not you meet the final requirement - the ability to safeguard information. Your performance here goes on your permanent record. So, even if you aren't now interested in a different assignment, you may be at a later time. Therefore, I would recommend that you do as well as you can.

This morning, you went over an observation course and were tested on what you knew about it. In a short while, you will be interrogated by an experienced interrogator who will try to get as much of that information as he can. Your job will be to keep it from him. How you do this is up to you.

The Leadership Human Research Unit developed the observation course you went over, and is assisting us in this evaluation program.

Now, remember when you get into the interrogation, the less information about this course you give the interrogator, the better off you will be. The interrogator will know only that you have been over a field problem and that you're up for a special assignment. If he sounds as if he has more information than that it will have been obtained from other people who have been over the course.

You probably have some questions. Please hold these until later. There will be a debriefing after your interrogation, and all your questions will be answered then. Raise your hands if you're interested in such an assignment. The corporal will take your numbers.

APPENDIX F-1

SUBJECT _____ TAG NO. _____ INTERVIEWER _____ SCORER _____

UNIT IDENTIFICATION

R W

STRENGTH, LOSSES
AND REPLACEMENTS

R W

FIELD OBJECTS

1. Bravo Company
2. location - 14
3. terrain
4. Fifteenth
5. Infantry
6. credit if both given
7. location - 3
8. terrain
9. 2nd
10. Brigade
11. credit if both given
12. location - 1
13. terrain

22. Company
23. at half strength
24. short of tanks
25. company
26. heavy casualties
27. company has
28. no platoon officers
29. 200 extra men
30. expected
31. as reinforcements

40. Aid Station
41. location - 2
42. terrain
43. STAV area sign
44. location - 8
45. terrain
46. phonetically correct
stave or staff
47. correct spelling

48. M sign
49. location - 5
50. terrain
51. description
52. MP Checkpoint sign
53. location - 7
54. terrain
55. Ravine
56. width at top
40-60 ft.
57. depth 15-30 ft.
58. location - 9

PERSONALITIES

32. Captain
33. Miller
34. Co. Commander
35. an ok type
36. General
37. Lee
38. nickname Robt. E.
39. thinks a lot of
B Co.

MORALE

14. any comment with
logical reason
indicate positive
or negative.

MISSION

15. as replacements
16. Brigade
17. attack
18. tomorrow
19. 0600 hours
20. Co.
21. spearhead the attack

IRRELEVANT INFORMATION TALLY _____

APPENDIX F-1

VIEWER _____ SCORER _____ DATE _____ COURSE _____ SCORE R _____
SCORE W _____

R W	FIELD OBJECTS	R W	FIELD OBJECTS (cont.)	R W	FIELD OBJECTS (cont.)
	40. Aid Station		59. 2nd		81. 6
	41. location - 2		60. Arty.		82. Commo
	42. terrain		61. Btry.		83. Unit
			62. location - 6		84. location - 12
	43. STAV area sign		63. terrain		85. terrain
	44. location - 8				
	45. terrain		64. Command Post		86. location - 10
	46. phonetically correct		65. Sandbagged bunker		87. location - 11
	stave or staff		66. location-3 (if not		88. location - 11
	47. correct spelling		given in U.I.#7)		89. length 200-300
			67. terrain (if not		90. location - 11
	48. M sign		given in U.I.#8)		91. location - 4
	49. location - 5				92. location - 4
	50. terrain		68. Odd Equipment		
	51. description		69. location - 10		
			70. terrain		93. Mine Field
	52. MP Checkpoint sign		71. ATLED 259 1½x2x6		94. length 100-150
	53. location - 7		ant;dials;pipe/muzzle		95. location - 11
	54. terrain				96. location - 11
			72. Barbed Wire		97. location - 11
	55. Ravine		73. location - 11		
	56. width at top		74. terrain		
	40-60 ft.				
	57. depth 15-30 ft.		75. Ammo Point		
	58. location - 9		76. in a ravine		
			77. width } No Credit		
			78. depth } if		
			79. location described		
			80. terrain in Ravine		
			item		

ION TALLY _____


APPENDIX F-2

SUBJECT _____ TAG No. _____ INTERVIEWER _____ SCORE _____

UNIT IDENTIFICATION	R	W	STRENGTH, LOSSES AND REPLACEMENTS	R	W	FIELD OBJECTS
1. Charley Company	+		20. company	+		36. 4th
2. location - 13	+		21. at full strength	+		37. Recon
3. terrain	+		22. short of ammo	+		38. Troop
4. Sixteenth	+		23. short of tanks	+		39. location - 4
5. Battalion	+		24. tank	+		40. terrain
6. credit if both given	+		25. replacements	+		41. PW
7. location - 8	+		26. expected	+		42. Collection Point
8. terrain	+		27. unit needing tanks	+		43. location - 3
9. Eighth	+			+		44. terrain
10. Division	+		<u>PERSONALITIES</u>	+		45. LAN area sign
11. credit if both given	+		28. Lieutenant	+		46. location - 2
12. location - 1	+		29. Larson	+		47. terrain
13. terrain	+		30. Co. Commander	+		48. correct spelling
<u>MORALE</u>			31. never trusts anybody else to do a job	+		49. Command Post
14. any comment with logical reason. Indicate positive or negative.			32. General	+		50. Mine Field
			33. Grant	+		51. depth 20-60
			34. never satisfied with job done	+		52. // to W. Gate Rd.
			35. nickname old U.S.	+		53. location - 6
<u>MISSION</u>						54. terrain
15. as reinforcements	+					
16. hold the sector	+					
17. against expected enemy attack	+					
18. tomorrow	+					
19. 0600 hours	+					
			<u>IRRELEVANT INFORMATION TALLY</u>			

APPENDIX F-2

WER _____ SCORER _____ DATE _____ COURSE 2
 SCORE R _____
 SCORE W _____

R W	FIELD OBJECTS	R W	FIELD OBJECTS (cont.)	R W
+	36. 4th	+	55. Observation Post	+
+	37. Recon	+	56. location - 7	+
+	38. Troop	+	57. terrain	+
+	39. location - 4	+		+
+	40. terrain	+	58. Oda Equipment	+
+		+	59. location - 9	+
+	41. PW	+	60. terrain	+
+	42. Collection Point	+	61. AGEMO 437 1½x2x6	+
+	43. location - 3	+	ant;dials;pipe/muzzle	+
+	44. terrain	+		+
+		+	62.  sign	+
+	45. LAN area sign	+	63. location - 10	+
+	46. location - 2	+	64. terrain	+
+	47. terrain	+	65. description	+
+	48. correct spelling	+		+
+		+	66. Barbed Wire	+
+	49. Command Post	+	67. Location - 14	+
+		+	68. terrain	+
+	50. Mine Field	+		+
+	51. depth 20-60	+	69. 8	+
+	52. // to W. Gate Rd	+	70. Salvo	+
+	53. location - 6	+	71. Unit	+
+	54. terrain	+	72. location - 11	+
		+	73. terrain	+
		+		+
		+	74. Eng. Supply Point	+
		+	75. location - 5	+
		+	76. terrain	+

ION TALLY _____

APPENDIX G

Interrogator Observation Categories: Manipulative Strategies*

Distractor. This category refers to behavior of the interrogator which distracts the source from the main purpose of the interrogation - the extraction of information - by diverting the conversation to topics perceived as safe for discussion by the source, or by supporting a discussion of such topics initiated by the source. It does not apply in those instances in which the interrogator, unintentionally or inadvertently, allows control of the interaction to pass to the source. There are two criteria for classifying behavior in this category: (a) the content of the exchange is irrelevant or tangential, and (b) it was initiated or intentionally permitted by the interrogator - it appears that he intends to distract or be distracted by the source.

Buddy. In this role, the interrogator tries to play the part of friend or equal to the source, acting in a non-threatening, non-authoritarian way. In general, he is attempting to reduce the initial social and/or psychological distance between himself and the source.

Boss. Behavior which indicates that the interrogator intends to establish or make clear to the source that authority and power reside in him (the interrogator) is classified as falling in the "Boss" strategy. In this case, the interrogator makes explicit his power over the subject. The interrogator's intent defines the category. Behavior demonstrating his superior skill or intelligence would fall under the Outsmarter category, since the intent would be more relevant to that classification.

Outsmarter. This strategy assumes that the individual who has been shown to be outsmarted by another will show greater willingness to comply; he sees that the other individual can stay one step ahead of him and that further evasion is not worthwhile.

Deceiver. In this strategy, the interrogator resorts to deception to trick or mislead the source into believing that the situation is not an interrogation (e.g., by asserting that the interrogation is to come later or that it has been concluded). It is a strategy in the sense that the interrogator attempts to restructure the situation to his advantage.

*Only a brief description of each general strategy is presented here. These descriptions were elaborated, and supplemented by instances of positive, negative, and neutral values of each strategy, for use by the raters.

APPENDIX H

Comparisons of High and Low Output Groups and Reliability of Information Extraction Categories

The reliability of the four observers' ratings was evaluated two ways, by assessing first their agreement as to the rank ordering of incidence of all 17 categories for interrogations of each of four sources (Table H-1), and secondly, their agreement as to the rank ordering of these four interrogations, by category incidence, for each of the 17 categories (Table H-2). In the first instance, the reliability was more than satisfactory - $w^* = .92, .87, .90$ and $.88$. In the second instance, the agreement of the observers as to the rank ordering of the four interrogations in terms of incidence of each category was satisfactory for all of the categories presented in Table H-1 except for category 21, the w 's ranging from $.58$ to $.92$, with a median of $.86$. Thus, in general, the inter-observer reliability was satisfactory.

Table H-1

Agreement of Four Observers as to the Incidence of All
17 Categories for Each of Four Sources Taken Separately

<u>Source</u>	<u>w*</u>	<u>s</u>	<u>χ^2</u>	<u>df</u>	<u>P <</u>
201	.92	6010.00	58.88	16	.001
205	.87	5659.00	55.68	16	.001
207	.90	5874.00	57.60	16	.001
416	.88	5745.50	56.32	16	.001

*Kendall's coefficient of concordance.

Table H-2

Means of High and Low Output Sources on Frequency
of Categories, and Reliabilities of Categories

Information Extraction Categories:	High Output N=16		Low Output N=16		Reliability of Frequency Scores		
	\bar{X} No. of Statements	% of Total	\bar{X} No. of Statements	% of Total	w*	s	P<
Specific Identification:							
Total	29.1	34.7	27.4	37.9	.68	54.5	.05
a) objects	10.9	12.8	11.0	15.8	.86	69.0	.01
b) units	4.4	4.9	1.4	1.8	.74	59.5	.05
c) terrain	6.6	8.2	5.2	7.1	.68	54.5	.05
d) description of objects	7.8	9.0	9.8	13.4	.84	67.5	.01
Specific Briefing							
Information: Total	24.2	29.6	18.8	27.5	.92	74.0	.01
a) personalities	7.6	9.2	5.3	7.5	.91	72.5	.01
b) OB, strength, losses, etc.	8.8	11.3	6.9	10.6	.70	56.0	.05
c) mission	2.8	3.4	3.0	4.1	.91	72.5	.01
d) supplies	1.9	2.1	1.1	1.8	.92	74.0	.01
e) support	2.4	2.8	1.6	2.3	.91	72.5	.01
f) morale	.1	.8	.8	1.1	.64	51.5	.05
Specific Location: Total	19.1	23.5	15.2	22.3	.87	69.5	.01
Uncontrolled (non- directive): Total	10.0	12.2	8.8	12.4	.58	46.0	NS
TOTAL	82.3	100	70.1	100	.90	72.0	.01

Table H-3

Means of High and Low Output Sources on Post-Tests

Variable	\bar{X}		P**
	High Output N=16	Low Output N=16	
Amount of stress during interrogation	47.6	59.8	NS
Hostility toward interrogator	20.1	16.7	NS
Amount of stress before interrogation	38.3	34.3	NS
Loyalty	27.4	27.9	NS
Amount of accurate information available (scores on written test)	46.4	43.0	NS
Number of minutes in interrogation	36.9	28.0	.05

*Kendall's coefficient of concordance.

**All differences were evaluated by Mann-Whitney U Tests.

INTERROGATOR _____

APPENDIX I
SOURCE _____

TAG NO. _____

Please give your estimate of the accuracy of the information the source provided for each general category of information listed below, by placing a check in the space along each line above the description which seems most appropriate.

1. Unit Identification

<u>extremely</u>	<u>moderately</u>	<u>more inaccurate</u>	<u>more accurate</u>	<u>moderately</u>	<u>extremely</u>	<u>unable to</u>
<u>inaccurate</u>	<u>inaccurate</u>	<u>than accurate</u>	<u>than inaccurate</u>	<u>accurate</u>	<u>accurate</u>	<u>estimate</u>

2. Morale

<u>extremely</u>	<u>moderately</u>	<u>more inaccurate</u>	<u>more accurate</u>	<u>moderately</u>	<u>extremely</u>	<u>unable to</u>
<u>inaccurate</u>	<u>inaccurate</u>	<u>than accurate</u>	<u>than inaccurate</u>	<u>accurate</u>	<u>accurate</u>	<u>estimate</u>

3. Mission

<u>extremely</u>	<u>moderately</u>	<u>more inaccurate</u>	<u>more accurate</u>	<u>moderately</u>	<u>extremely</u>	<u>unable to</u>
<u>inaccurate</u>	<u>inaccurate</u>	<u>than accurate</u>	<u>than inaccurate</u>	<u>accurate</u>	<u>accurate</u>	<u>estimate</u>

4. Strength, Losses
and Replacements

<u>extremely</u>	<u>moderately</u>	<u>more inaccurate</u>	<u>more accurate</u>	<u>moderately</u>	<u>extremely</u>	<u>unable to</u>
<u>inaccurate</u>	<u>inaccurate</u>	<u>than accurate</u>	<u>than inaccurate</u>	<u>accurate</u>	<u>accurate</u>	<u>estimate</u>

5. Personalities

<u>extremely</u>	<u>moderately</u>	<u>more inaccurate</u>	<u>more accurate</u>	<u>moderately</u>	<u>extremely</u>	<u>unable to</u>
<u>inaccurate</u>	<u>inaccurate</u>	<u>than accurate</u>	<u>than inaccurate</u>	<u>accurate</u>	<u>accurate</u>	<u>estimate</u>

6. Field Objects

<u>extremely</u>	<u>moderately</u>	<u>more inaccurate</u>	<u>more accurate</u>	<u>moderately</u>	<u>extremely</u>	<u>unable to</u>
<u>inaccurate</u>	<u>inaccurate</u>	<u>than accurate</u>	<u>than inaccurate</u>	<u>accurate</u>	<u>accurate</u>	<u>estimate</u>

APPENDIX J

INTERROGATOR _____

SOURCE _____

TAG NO. _____

Please give your estimate of the source's resistance by placing a check in the one space along each line above the description which seems most appropriate. Please be sure to answer every question.

1. How willing was the source, at the beginning of the interrogation, to provide you with the information you wanted?

<u>extremely</u>	<u>moderately</u>	<u>more unwilling</u>	<u>more willing</u>	<u>moderately</u>	<u>extremely</u>
unwilling	unwilling	than willing	than unwilling	willing	willing

2. How willing was the source, by the end of the interrogation, to provide you with the information you wanted?

<u>extremely</u>	<u>moderately</u>	<u>more unwilling</u>	<u>more willing</u>	<u>moderately</u>	<u>extremely</u>
unwilling	unwilling	than willing	than unwilling	willing	willing

3. In general, how willing was the source to provide you with the information you wanted?

<u>extremely</u>	<u>moderately</u>	<u>more unwilling</u>	<u>more willing</u>	<u>moderately</u>	<u>extremely</u>
unwilling	unwilling	than willing	than unwilling	willing	willing